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# SEQUENCE LISTINGS

SEQ ID NO	CLONE NAME	SEQUENCE
SEQ ID NO: 1	405 (pumilus)	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGGTGCTGTCAGTCACATCGC TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT GAACACAATCCAGTTGTTATGGTTCACGGTAT CGGAGGAGCTTCATACAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCACGG GGCAAGCTGTATGCGGTTGATTTTTTGGGACAA GACAGGGACGAATTATAACAATGGCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGACGAA ACGGGTGCGAAAAAAGTGGATATTGTGCGCTCA CAGTATGGGTGGCGCGAACACACCTTACTACA TAAAAAATCTGGACGGCGGAAATAAAATTGAA AACGTCGTAAACGCTTGGCGGCGCGAACCGTTC GACGACAAGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATGAATTACTT ATCAAAATTAGACGGTGCTAAAAACGCTCAAA TTCATGGCGTTGGGCACATTGGTTTTATTGATG AACAGCCAAGTCAACAGCCTGATTAAAGAAGG ACTGAACGGCGGGGGGCCAAAATACGAATTAA
SEQ ID NO: 2	406 (subtilis)	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGTATGCTGTCTGTTACATCGC TGTTTGCGTTGCAGCCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTTTTGGGACAA GACAGGCACAAATTATAACAATGGACCGGTAT TACCACGATTTGTGCAAAAGGTTTTAGATGAA ACGGGTGCGAAAAAAGTGGATATTGTGCGCTCA CAGCATGGGGGGCGCGAACACACTTTACTACA TAAAAAATCTGGACGGCGGAAATAAAGTTGCA AACGTCGTGACGCTTGGCGGCGCGAACCGTTT GACGACAGGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATAAATTACTT ATCAAGATTAGATGGTGCTAGAAACGTTCAAA TCCATGGCGTTGGACACATCGGCCTTCTGTAC AGCAGCCAAGTCAACAGCCTGATTAAAGAAGG GCTGAACGGCGGGGGACTCAATACAAATTAG
SEQ ID NO: 3	402 (megaterium)	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGGTGCTGTCAGTCACATCGC TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT GACACAATCCAGTTGTTATGGTTCACTGGTAT

		CGGAGGAGCTTCATACAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCACGG GGCAAGCTGTATGCGGTTGATTTTTTGGGACAA GACAGGGACGAATTATAACAATGGCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGACGAA ACGGGTGCGAAAAAAGTGGATATTGTCGCTCA CAGCATGGGTGGCGCGAACACACTTTACTACA TAAAAAATCTGGACGGCGGAAATAAAATTGAA AACGTCGTAACGCTTGGCGGCGCGAACCGTTT GACGACAAGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATGAATTACTT ATCAAAATTAGACGGTGCTAAAAACGTTCAAA TTCATGGCGTTGGGCACATTGGTTTATTGATG AACAGCCAAGTCAACAGCCTGATTAAAGAAGG ACTGAACGGCGGGGGCCACAATACAAATTAA
SEQ ID NO: 4	400 (lentus)	ATGAAATTTGTAAAAAGAAGGATCATTCGACT TGTAACAATTTTGGTGCTGTCAGTCACATCGC TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT GAACACAATCCAGTTGTTATGGTTCACGGTAT CGGAGGAGCTTCATACAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCACGG GGCAAGCTGTATGCGGTTGATTTTTTGGGACAA GACAGGGACGAATTATAACAATGGCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGACGAA ACGGGTGCGAAAAAAGTGGATATTGTCGCTCA CAGCATGGGTGGCGCGAACACACTTTACTACA TAAAAAATCTGGACGGCGGAAATAAAATTGAA AACGTCGTAACGCTTGGCGGCGCGAACCGTTT GACGACAAGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATGAATTACTT ATCAAAATTAGACGGTGCTAAAAACGTTCAAA TTCATGGCGTTGGGCACATTGGTTTATTGATG AACAGCCAAGTCAACAGCCTGATTAAAGAAGG ACTGAACGGCGGAGGACTAAATACAAATTAA
SEQ ID NO: 5	396 (circulans)	ATGAAATTTATAAAAAGAAGGATCATTCGACT TGTAACAATTTTGGTGCTGTCAGTCACATCGC TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT GAACACAATCCAGTTGTTATGGTTCACGGTAT CGGAGGAGCTTCATACAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCACGG GGCAAGCTGTATGCGGTTGATTTTTTGGGACAA GACAGGGACGAATTATAACAATGGCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGACGAA ACGGGTGCGAAAAAAGTGGATATTGTCGCTCA CAGCATGGGTGGCGCGAACACACTTTACTACA

		<p>TAAAAAATCTGGACGGCGGAAATAAAATTGAA  AACGTCGTAACGCTTGGCGGCGCGAACCCTTT  GACGACAAGCAAGGCGCTTCCGGGAACAGATC  CAAATCAAAAGATTTTATACACATCCATTTAC  AGCAGTGCCGATATGATTGTCATGAATTACTT  ATCAAAATTAGACGGTGCTAAAAACGTTCAAA  TTCATGGCGTTGGGCACATTGGTTTATTGATG  AACAGCCAAGTCAACAGCCTGATTAAAGAAGG  ACTGAACGGCGGGGGCCTCAATACAAATTAA</p>
SEQ ID NO: 6	392 (azotoformans)	<p>ATGAAATTTGTAAAAAGAAGGATCATTGCACT  TGTAACAATTTTGGTGCTGTCAGTCACATCGC  TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT  GAACACAATCCAGTTGTTATGGTTCACGGTAT  CGGAGGAGCTTCATACAATTTTGCGGGAATTA  AGAGCTATCTCGTATCTCAGGGCTGGTCACGG  GGCGAGCTGTATGCGGTTGATTTTTGGGACAA  GACAGGGACGAATTATAACAATGGCCCCGGTAT  TATCACGATTTGTGCAAAAGGTTTTAGACGAA  ACGGGTGCGAAAAAAGTGGATATTGTGCTCA  CAGCATGGGTGGCGCGAACACACTTTACTACA  TAAAAAATCTGGACGGCGGAAATAAAATTGAA  AACGTCGTAACGCTTGGCGGCGCGAACCCTTT  GACGACAAGCAAGGCGCTTCCGGGAACAGATC  CAAATCAAAAGATTTTATACACATCCATTTAC  AGCAGTGCCAATATGATTGTCATGAATTACTT  ATCAAAATTAGACGGTGCTAAAAACGTACAAA  TTCATGGCGTTGGGCACATTGGTTTATTGATG  AACAGCCAAGTCAACAGCCTGATTAAAGAAGG  ACTGAACGGCGGGGGCCTAGATACAAATTAA</p>
SEQ ID NO: 7	398 (firmus)	<p>ATGAAATTTGTAAAAAGAAGGATCATTGCACT  TGTAACAATTTTGGTGCTGTCAGTCACATCGC  TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT  GAACACAATCCAGTTGTTATGGTTCACGGTAT  CGGAGGAGCTTCATACAATTTTGCGGGAATTA  AGAGCTATCTCGTATCTCAGGGCTGGTCACGG  GGCAAGCTGTATGCGGTTGATTTTTGGGACAA  GACAGGGACGAATTATAACAATGGCCCCGGTAT  TATCACGATTTGTGCAAAAGGTTTTAGACGAA  ACGGGTGCGAAAAAAGTGGATATTGTGCTCA  CAGCATGGGTGGCGCGAACACACTTTACTACA  TAAAAAATCTGGACGGCGGAAATAAAATTGAA  AACGTCGTAACGCTTGGCGGCGCGAACCCTTT  GACGACAAGCAAGGCGCTTCCGGGAACAGATC  CAAATCAAAAGATTTTATACACATCCATTTAC  AGCAGTGCCGATATGATTGTCATGAATTACTT  ATCAAAATTAGACGGTGCTAAAAACGTCAAA  TTCATGGCGTTGGGCACATTGGTTTATTGATG</p>

		AACAGCCAAGTCAACAGCCTGATTAAAGAAGG ACTGAACGGCGGAGGCCACAATACAAATTAA
SEQ ID NO: 8	393 (badius)	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGGTGCTGTCAAGTCACATCGC TGTTTGCGATGCAGCCGTCAGCAAAAGCCGCT GAACACAATCCAGTTGTTATGGTTCACGGTAT CGGAGGAGCTTCATACAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCACGG GGCAAGCTGTATGCGGTTGATTTTTTGGGACAA GACAGGGACGAATTATAACAATGGCCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGACGAA ACGGGTGCGAAAAAAGTGGATATTGTGCTCA CAGCATGGGTGGCGCGAACACACTTTACTACA TAAAAAATCTGGACGGCGGAAATAAAATTGAA AACGTCGTAAACGCTTGCGGGCGCGAACCGTTT GACGACAAGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATGAATTACTT ATCAAAATTAGACGGTGCTAAAAACGTTCAAA TTCATGGCGTTGGGCACATTGGTTTATTGATG AACAGCCAAGTCAACAGCCTGATTAAAGAAGG ACTGAACGGCGGAGGCCACAATACAAATTAA
SEQ ID NO: 9	Dc5h	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGTATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCAAGGACAA GACAGGCACAAATTATAACAATGGCCCCGGTAT TATCACGATTTGTGCAAAAGGTTTTAGATGAA ACGGGTGCGAAAAAAGTGGATATTGTGCTCA CAGCATGGGGGGCGCGAACACACTTTACTACA TAAAAAATCTGGACGGCGGAAATAAAGTTGAA AACGTCGTGACGCTTGCGGGCGCCAACCGTTT GACGACAGGCAAGGCGCTTCCGGGAACAGATC CAAATCAAAAGATTTTATACACATCCATTTAC AGCAGTGCCGATATGATTGTCATGAATTATTT ATCAAGATTAGATGGTGCGAGAAACGTTCAAA TCCATGGCGTTGGACACATCGGCCTTCTGTAC AGCAGCCAAGTCAACAGCCTGATTAAAGAAGG GCTGAACGGCGGGGGCCTCAATACAAATTAA
SEQ ID NO: 10	Dc5f	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGTATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA

		AGAGCTACCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCTAAGACAA AACAGGGAATAACCGCAACAATGGTCCGCGTC TATCGAGATTCGTCAAAGATGTGTTAGACAAA ACGGGTGCCAAAAAAGTAGATATTGTGGCTCA TAGTATGGGTGGAGCGAACACGCTATACTATA TCAAGAATCTAGATGGCGGCGATAAAATTGAG AACGTTGTCACAATTGGTGGAGCAAACGGACT CGTTTCAAGCAGAGCATTACCAGGCACAGATC CAAATCAAAAAATTCTTTACACATCCGTCTAT AGCTCAGCAGATCTTATTGTCGTCAACAGCCT CTCTCGTTTAATTGGCGCAAGAAACATCCTGA TCCATGGCGTTGGTCATATCGGTCTATTAACC TCAAGCCAAGTGAAAGGGTATATTAAAGAAGG ACTGAACGGCGGAGGCCTCAATACAAATTAA
SEQ ID NO: 11	Dc5c1	ATGAAAGTGATTTTTTGTTAAGAAAAGGAGTTT GCAAATTCTTGTGTTGCCCTTGCCTTAGTGCTAG GTTCAATAGCCTTCATCCAGCCGAAAGAAGCC AAAGCGGCTGAGCATAATCCGGTTGTAATGGT GCATGGCATGGGTGGTGCCTTATAACTTTG CTTCGATCAAACGATACTTAGTATCACAGGGA TGGGATCAAACCAACTTTTTGCAATCGATTT CATAGACAAAACAGGCAATAACCTAAACAATG GCCCCAGGCTCTCGAGATTTCGTGAAAGACGTA CTAGCCAAAACGGGCGCCAAAAAAGTAGATAT TGTGGCTCATAGTATGGGCGGTGCGAACACGT TATACTATATTAAAAACCTAGACGGTGGAGAT AAAATTGAAAACGTTCGTACATTAGGTGGAGC AAACGGACTCGTATCACTCAGAGCATTACCAG GCACCGATCCAAATCAAAAAATTCTTTACACA TCTGTCTATAGCTCAGCCGATCTCATTGTCTG CAACAGCCTTTTCGCGTTTAATTGGCGCAAGAA ACGTCCTGATCCACGGCGTTGGACATATCGGT CTATTAACCTCAAGCCAAGTCAAAGGCTATGT GAAAGAAGGATTGAATGGCGGGGACAGAATA CAAATTAA
SEQ ID NO: 12	Dc5a2	ATGAAAGTGATTTTTTGTTAAGAAAAGGAGTTT GCAAATTCTTGTGTTGCTTGCAATTGGTGATGG GTTCAATGGCCTTCATCCAGCCAAAAGAGATC AGAGCGGCTGAGCATAATCCGGTTGTGATGGT ACATGGCATGGGCGGTGCGTCTTATAACTTTG CTTCGATTAAAAGTTACTTGGTATCACAAAGGA TGGGATCGAAACCAATTATTTGCTATCGATTT CATAGACAAAACAGGTAATAACCGCAACAATG GTCCGCGTCTATCCAGATTTCGTCAAAGATGTG CTAGCCAAAACAGGTGCCAAAAAAGTTGATAT TGTGGCTCATAGTATGGGCGGAGCGAACACGT

		TATACTATATTAAGAATCTAGACGGCGGCGAT AAAATAGAAAACGTTGTTACACTTGGTGGAGC GAACGGACTCGTTTCACTCAGAGCATTACCAG GCACCGATCCAAATCAAAAAATCCTTTACACA TCCGTCTACAGCTCAGCCGATCTTATCGTCGT CAACAGCCTCTCGCGTTTAATTGGCGCAAGAA ACGTCCTCATTACGGCGTTGGTCACATCGGT CTATTAGCTTCAAGCCAAGTCAAAGGCTATAT CAAAGAAGGACTGAATGGCGGAGGCCAAAATA CAAATTAA
SEQ ID NO: 13	Dc512	ATGAAAGTGATTTTTGTTAAGAAAAGGAGTTT GCAAATTCTCATTGCGCTTGCATTGGTGATTG GTTCAATGGCGTTTATCCAGCCGAAAGAGGCG AAGGCGGCTGAGCATAATCCGGTTGTGATGGT GCATGGCATTGGCGGTGCCTCTTATAACTTTT TTTCTATTAAAAGTTATTTGGCCACACAAGGC TGGGATCGAAACCAATTATATGCTATTGATTT CATAGACAAAACAGGAAATAACCGCAACAATG GTCCGCGTCTATCGAGATTTCGTCAAAGATGTG TTAGACAAAACGGGTGCCAAAAAAGTAGATAT TGTGGCTCATAGTATGGGTGGAGCGAACACGC TATACTATATCAAGAATCTAGATGGCGGCGAT AAAATTGAGAACGTTGTCACAATTGGTGGAGC AAACGGACTCGTTTCAAGCAGAGCATTACCAG GCACAGATCCAAATCAAAAAATCCTTTACACA TCCGTCTATAGCTCAGCAGATCTTATTGTTCGT CAACAGCCTCTCTCAGTTTAATTGGCGCAAGA AACATCCTGATCCAGGCGTTGGTCATATCGGT CTATTAACCTCAAGCCAAGTGAAAGGGTATAT TAAAGAAGGACTGAACGGCGGAGGCCTCAATA CAAATTAA
SEQ ID NO: 14	Sga	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAAGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCAGGGACAA GACAGGCAATAACTTAAACAACGGTCCAGTAT TATCGCGTTTTCGTGAAAAAGGTATTAGATGAA ACCGGTGCGAAAAAAGTGGATATTGTTCGCTCA CAGCATGGGCGGCGCTAACACGCTTTACTACA TAAAAAATTTGGATGGCGGTAATAAAATTGAA AACGTGTAACACTTGGCGGCGCGAATCGTCT TGTGACAGGCAAGGCGCTTCCGGGTACTGATC CCAACCAAAAGATCTTGTACACATCCGTTTAC AGTAGTGCTGATATGATTGTTATGAATTACTT

		AACAAAATTAGACGGGGCTAAAAATGTTCAAA TTCATGGTGTCTGGACATATCGGCCTTCTGTAC AGCAGCCAAGTCAACAGCCTGATTAAAGAAGG GCTTAACGGCGGAGGCCTCAATACAAATTAA
SEQ ID NO: 15	Sgc	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCTGGGATAA GACAGGCAATAACTTAAACAACGGTCCAGTAT TATCGCGTTTTGTGAAAAAGGTATTAGATGAA ACCGGTGCGAAAAAAGTGGATATTGTGCTCA CAGCATGGGCGGCGCTAACACGCTTTACTACA TAAAAAATTTGGATGGCGGTAATAAAATTGAA AACGTCGTAACACTTGGCGGCGCGAATCGTCT TGTGACAGGCAAGGCGCTTCCGGGTACTGATC CCAACCAAAAGATATTGTACACATCCGTTTAC AGTAGTGCTGATATGATTGTTATGAATTACTT ATCAAAATTAGACGGGGCTAAAAATGTTCAAA TTCATGGTGTCTGGACATATCGGCCTTCTGTAC AGCAGCCAAGTCAATAGCCTGATTAAAGAAGG GCTTAACGGCGGAGGACTCAATACGAATTAA
SEQ ID NO: 16	Sgd	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTTAGTGACAA AACAGGCAATAACTTAAACAACGGTCCAGTAT TATCGCGTTTTGTGAAAAAGGTATTAGATGAA ACCGGTGCGAAAAAAGTGGATATTGTGCTCA CAGCATGGGCGGCGCTAACACGCTTTACTACA TAAAAAATTTGGATGGCGGTAATAAAATTGAA AACGTCGTAACACTTGGCGGCGCGAATCGTCT TGTAACAGGCAAGGCGCTTCCGGGTACTGATC CCAACCAAAAGATCTTGTACACATCCGTTTAC AGTAGTGCTGATATGATTGTTATGAATTACTT ATCAAAATTAGACGGGGCTAAAAATGTTCAAA TTCATGGTGTCTGGACATATCGGCCTTCTGTAC AGCAGCCAAGTCAACAGCCTGATTAAAGAAGG GCTTAACGGCGGGGGCCTGAATACGAATTAA
SEQ ID NO: 17	Sgf	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT



		GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCAAAGACAA GACAGGGAATAACCGCAACAATGGTCCGCGTC TATCGAGATTCGTCAAAGATGTGTTAGACAAA ACAGGAGCCAAAAAAGTAGATATTGTGGCTCA TAGTATGGGCGGAGCGAACACATTATACTATA TTAAGAATCTAGATGGTGGCGATAAAATTGAG AACGTTGTCACAATTGGTGGAGCAAACGGACT CGTTTCAAGCAGAGCATTACCAGGCACAGATC CAAATCAAAAAATTCTTTACACATCCGTCTAT AGCTCAGCAGATCTTATTGTCTCAACAGTCT CTCTCGTTTAAATTGGCGCAAGAAACGTCCAAA TCCATGGCGTTGGACATATCGGTCTATTAACC TCAAGCCAAGTCAAAGGATATATTAAAGAAGG ACTGAACGGCGGGGGCCTCAATACAAATTAA
SEQ ID NO: 18	Sgh	ATGAAATTTGTAAAAAGAAGGATCCTTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTTCGTTTGAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTCATTGACAA GACAGGAAATAACCGCAACAATGGTCCGCGTC TATCGAGATTCGTCAAAGATGTGTTAGACAAA ACAGGAGCCAAAAAAGTAGATATTGTGGCTCA TAGTATGGGCGGAGCGAACACATTATACTATA TTAAGAATCTAGATGGTGGCGATAAAATTGAG AACGTTGTCACAATTGGTGGAGCAAACGGACT CGTTTCAAGCAGAGCATTACCAGGCACAGATC CAAATCAAAAAATTCTTTACACATCCGTCTAT AGCTCAGCAGATCTTATTGTCTCAACAGTCT CTCTCGTTTAAATTGGCGCAAGAAACGTCCAAA TCCATGGCGTTGGACATATCGGTCTATTAACC TCAAGCCTAGTCAAAGGATATATTAAAGAAGG ACTGAACGGCGGAGGCCAAAATACAAATTAA
SEQ ID NO: 19	Mt2b1	ATGAAAGTGATTTTTGTTAAGAAAAGGAGTTT GCAAATTCTTGTTGCCCTTGCCCTTAGTGATAG GTTCAATGGCCTTCATCCAGCCAAAAGAAATC AAAGCAGCTGAGCACAAATCCGGTTGTGATGGT ACATGGTATTGGAGGAGCGTCTTATAACTTTG CTTCGATTAAAAGTTATTTGGTTAACCAAGGC TGGGATCGAAACCAATTATTTGCTATCGATTT CATAGACAAAACAGGGAATAACCGCAACAATG GTCCTCGTTTATCTAGATTCGTCAAAGATGTG CTAGACAAAACGGGTGCCAAAAAAGTAGATAT

		TGTGGCGCATAGTATGGGCGGGGCGAACACGC TATACTATATTAAGAATCTAGATGGCGGCGAT AAAATTGAAAACGTCGTCACCATTTGGTGGAGC AAACGGACTCGTTTCACTCAGAGCATTACCAG GAACAGATCCAAATCAAAAAATTCTCTATACA TCTGTCTATAGCTCAGCCGATTTGATTGTCTGT CAACAGCCTTTTCGCGTTTAACTGGCGCAAGAA ATGTCCTGATCCACGGCGTTGGCCATATCGGT CTATTAACCTCAAGCCAAGTGAAAGGGTATAT TAAAGAAGGACTGAACGGCGGGGGCCTAAATA CAAATTAA
SEQ ID NO: 20	H2a	ATGAAATTTGTAAAAAGAAGGATCATTGCACT TGTAACAATTTTGATGCTGTCTGTTACATCGC TGTTTGCGTTGCAACCGTCAGCAAAAGCCGCT GAACACAATCCAGTCGTTATGGTTCACGGTAT TGGAGGGGCATCATTCAATTTTGCGGGAATTA AGAGCTATCTCGTATCTCAGGGCTGGTCGCGG GACAAGCTGTATGCAGTTGATTTACAGGACAA GACAGGAAATAACCGCAACAATGGTCCGCGTC TATCTAAATTCGTCAAAGATGTGTTAGACAAA ACGGGTGCCAAAAAAGTAGATATTGTGGCTCA TAGTATGGGCGGGGCGAACACGCTATACTATA TTAAGAATCTAGATGGCGGCGATAAAATTGAG AACGTTGTCAACAATTGGCGGAGCAAACGGACT CGTTTCAAGCAGAGCATTACCAGGCACAGATC CAAATCAAAAAATTCTTTACACATCCGTCTAC AAGCTCAGCCGATCTCATTGTCTGCAACAGTC TCTCTCGTTTAATTGGCTGCAAGAAACAGTCC AAATCCATGGCGTTGGACATATCGGTCTATTA ACCTCAAGCCAAGTCAAAGGATATATTAAAGA AGGACTGAACGGCGGGGGACTAAATACAAATT AA
SEQ ID NO: 21	lf15(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGGCAAGCTGTATGCGGTTGATTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCGCGTTTTTGTGAAAAAGGTATTAGATGA AACGGGTGCGAAAAAAGTGGATATTGTCTGCTC ACAGCATGGGCGGCGCTAACACGCTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAACGTCGTAACGCTTGGCGGCACGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT

		GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGACTCAATACGAATTGA
SEQ ID NO: 22	3C12	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCTAGATTTCGTCAAAGATGTGCTAGACAA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGACTCAATACGAATTGA
SEQ ID NO: 23	3N19(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA GGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGAAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGACATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CGGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATCCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGACTGAATACAAATTGA
SEQ ID NO: 24	G2.2	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT

		CCAAATCAAAAGATTTTATACACATCCATTTA CGGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTACAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGGACTCAATACGAATTGA
SEQ ID NO: 25	2C3	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGCGGCGCGAACACACTTTACTAC ATAAAAAATTTGGATGGCGGTAATAAAATTGA AAACGTCGTCACCATTGGTGGAGCAAACGGAC TCGTTTCAAGCAGAGCATTACCAGGCACAGAT CCAAATCAAAAAATTCTTTACACATCCGTCTA TAGCTCAGCAGATCTTATTGTCTGCAACAGTC TCTCTCGTTTAATTGGCGCAAGAAACGTCCAA ATCCATGGCGTTGGACATATCGGTCTATTAAC CTCAAGCCAAGTCAAAGGATATATTAAAGAAG GGCTTAACGGCGGGGGCCACAATACGAATTGA
SEQ ID NO: 26	2F11	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGAGCTTCATACAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACC GGTTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAGGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTACAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAAAGGATATATTAAAGAAG GACTGAACGGCGGAGGCCTAAATACGAATTGA
SEQ ID NO: 27	KV11(6C7)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATCCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTGGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC

		ACAGTATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGTACTGAT CCCAACCAAAAGATCTTGTACACATCCGTTTA CAGTAGTGCTGATATGATTGTTATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCATAACAAATTGA
SEQ ID NO: 28	KV6(3A1)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTAGTTTTCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTGGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGTATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGTACTGAT CCCAACCAAAAGATCTTGTACACATCCGTTTA CAGTAGTGCTGATATGATTGTTATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCATAACAAATTGA
SEQ ID NO: 29	KV2(2D1)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGAGCTTCATACAGTTTTCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCCAACCAAAAGATCTTGTACACATCCGTTTA CAGTAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGTGTGCGACATATCGGCCTTCTGTA CAGCAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCAAAAATAACAAATTGA
SEQ ID NO: 30	N2.5	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGAGCTTCATACAGTTTTCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG

050307Z

		GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAAC TGAT CCCAACCAAAAGATCTTGTACACATCCGTTTA CAGTAGTGCTGATATGATTGTTATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACACTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGGCCACAATACAAATTGA
SEQ ID NO: 31	KV5(2H6)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGAGCATCATACAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATACGGTTGATTTTTGGGACA AGACAGGCACAAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAATCGTC TTGTAACAGGCAAGGCGCTTCCGGGAACAGAT CCCAATCAAAAGATTTTGTACGCATCCGTTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCTGAATACAAATTGA
SEQ ID NO: 32	3E5	TGAACACAATCCAGTCGTTATGGTTCACGGTA TTGGAGGGGGCATCATTCAATTTTGCGGGAATT AGGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA GGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGATGA AACCGGTGCGAAAAAAGTGGACATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATCCATGGCGTTGGACACATCGGCCTTCTGTA CAGCAGCCAAGTCAACAGCCTGATTAAAGAAG

		GACTGAACGGCGGGGGCCTCAATACGAATTGA
SEQ ID NO: 33	G2.1	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGCATCATTCAATTTTGC GGGAATT AGGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACCGGTGCGAAAAAAGTGGACATTGTGCGCTC ACAGCATGGGCGGCGCTAACACGCTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCACGAACCGTT TGACGACAAGCAGGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAACTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGACTCAATACGAATTGA
SEQ ID NO: 34	3H24(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCCGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACAA AACGGGTGCGAAAAAAGTGGATATTGTGCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGACTCAATACGAATTGA
SEQ ID NO: 35	KV10(4G6)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTGTCTCAGGGCTGGCCGCG GGACAAGCTGTATGCAGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTGCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAGCGTCGTAACACTTGGCGGCGCGAATCGTC TTGTAACAGGCAAGGCGCTTCCGGGAAGTAT CCCAACCAAAAGATTTTATACACATCCATTTA

		CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTCGGACATATCGGCCTTCTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCACAATACAAATTGA
SEQ ID NO: 36	KV12(6D4)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGGCATCATTAGTTTTCGCGGAATT AGGAGCTATCTCGTATCTCAGGGCTGGCCGCG GGACAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGCACAAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCCC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAACGTCGTGACGCTTGGCGGCGCCAACCGTT TGACGACAGGCAAGGCGCTTCCGGGTACTGAT CCCAATCAAAAGATTTTATACACATCCGTTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGGCTGATTAAAGAAG GACTGAACGGCGGAGGCCACAATACAAATTGA
SEQ ID NO: 37	N2.2	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGGCATCATTAGTTTTCGCGGAATT AGGAGCTATCTCGTATCTCAGGGCTGGCCGCG GGACAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGCACAAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCCT ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAACGTCGTGACGCTTGGCGGCGCCAACCGTT TGACGACAGGCAAGGCGCTTCCGGGTACTGAT CCCAATCAAAAGATTTTATACACATCCGTTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGGCTGATTAAAGAAG GACTGAACGGCGGAGGCCACAATACAAATTGA
SEQ ID NO: 38	N2.3	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGGGGGGGCATCATTAGTTTTCGCGGAATT AGGAGCTATCTCGTATCTCAGGGCTGGCCGCG GGACAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGCACAAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCCC ACAGCATGGGTGGCGCGAACACACTTTACTAC



		<p>ATAAAAAATCTGGACGGCGGAAATAAAGTTGG  AAACGTCGTGACGCTTGGCGGCGCCAACCGTT  TGACGACAGGCAAGGCGCTTCCGGGTACTGAT  CCCAATCAAAAGATTTTATACACATCCGTTTA  CAGCAGTGCCGATATGATTGTCATGAATTACT  TATCAAAATTAGACGGTGCTAAAAACGTTCAA  ATTCATGGCGTTGGGCACATTGGTTTATTGAT  GAACAGCCAAGTCAACAGGCTGATTAAAGAAG  GACTGAACGGCGGAGGCCACAATACAAATTGA</p>
SEQ ID NO: 39	N2.1	<p>TGAACACAATCCAGTTGTTATGGTTCACGGTA  TCGGAGGGGCATCATTCAAGTTTTCGCGGAATT  AGGAGCTATCTCGTATCCCAGGGCTGGCCGCG  GGACAAGCTGTATGCGGTTGATTTTTGGGACA  AGACAGGCACAAATTATAACAATGGCCCGGTA  TTATCACGATTTGTGCAAAAGGTATTAGATGA  AACCGGTGCGAAAAAAGTGGATATTGTCGCCC  ACAGCATGGGTGGCGCGAACACACTTTACTAC  ATAAAAAATCTGGACGGCGGAAATAAAGTTGA  AAACGTCGTGACGCTTGGCGGCGCCAACCGTT  TGACGACAGGCAAGGCGCTTCCGGGTACTGAT  CCCAATCAAAAGATTTTATACACATCCGTTTA  CAGCAGTGCCGATATGATTGTCATGAATTACT  TATCAAAATTAGACGGTGCTAAAAACGTTCAA  ATTCATGGCGTTGGGCACATTGGTTTATTGAT  GAACAGCCAAGTCAACAGGCTGATTAAAGAAG  GACTGAACGGCGGAGGCCACAATACAAATTGA</p>
SEQ ID NO: 40	KV4(2E12)	<p>TGAACACAATCCAGTTGTTATGGTTCACGGTA  TTGGAGGGACATCATTCAATTTTTCGCGGAATT  AAGAGCTATCTCGTATCTCAGGGCTGGTCACG  GGACAAGCTGTATGCGGTTGATTTTTGGGACA  AGACAGGGACGAATTATAACAATGGCCCGGTA  TTATCACGATTTGTGCAAAAGGTTTTAGACGA  AACGGGTGCGAAAAAAGTGGATATTGTCGCTC  ACAGCATGGGCGGCGCCAACACGCTTTACTAC  ATAAAAAATCTGGACGGCGGAAATAAAATTGA  AAACGTCGTGACGCTTGGCGGCGCGAACCGTT  TGACGACAAGCAAGGCGCTTCCGGGAACAGAT  CCAAATCAAAAGATTTTATACACATCCATTTA  CAGCAGTGCCGATATGATTGTCATGAATTACT  TATCAAAATTAGACGGTGCTAAAAACGTTCAA  ATTCATGGCGTTGGGCACATTGGTTTATTGAT  GAACAGCCAAGTCAACAGCCTGATTAAAGAAG  GACTGAACGGCGGGGGCCACAATACAAATTGA</p>
SEQ ID NO: 41	KV9(4C6)	<p>TGAACACAATCCAGTTGTTATGGTTCACGGTA  TCGGAGGGGCATCATTCAAGTTTTCGCGGAATT  AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG  GGACAAGCTGTATGCAGTTGATTTTAGTGACA</p>

		AAACAGGCACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGATGGCGGTAATAAAATTGA AAACGTCGTAACACTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGTACTGAT CCCAACCAAAAGATCTTGTACACATCCATTTA CAGCAGTGCCGATATGGTTGTCATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGTGTGCGGGCACATTGGTTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCACAATACGAATTGA
SEQ ID NO: 42	7D6	TAAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATACAATTTTGCGGGAATA AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCTGTATGCAGTTGATTTTAGTGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGTAATAAAATTGA AAACGTCGTAACACTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAACTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGATTAAATACGAATTGA
SEQ ID NO: 43	3F3	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGAATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACCGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGCTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT TGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATCCATGGCGTTGGGCACATTGGTTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCAGAATACGAATTGA

SEQ ID NO: 44	2D11(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA GGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGAAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTCACACTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTGAACGGCGGAGGCCAGAAATACGAATTGA
SEQ ID NO: 45	3C23(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA GGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTCACACTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTTAACGGCGGGGGCCACAATACGAATTGA
SEQ ID NO: 46	G2.3	TGAACACAATCCAGTCGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATA AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA GGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAGAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTGCT

		TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCAGAATACGAATTGA
SEQ ID NO: 47	2A3	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCGTTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCTGTATGCAGTTGATTTCAAAGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGAAAAAGGTATTAGATGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGCGGCGCTAACACGCTTTACTAC ATAAAGAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGTACTGAT CCCAACCAAAAGATCTTGTACACATCCGTTTA CAGTAGTGCTGATATGATTGTTATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGAGGCCTAAATACAAATTGA
SEQ ID NO: 48	2F4	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGAAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCTAACACGCTTTACTAC ATAAAAAATCTGGACGGCGGCGATAAAATTGA GAACGTCGTAACACTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAGATCTTGTACACATCCGTTTA CAGTAGTGCTGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTGAACGGCGGAGGCCAGAATACGAATTGA
SEQ ID NO: 49	2B9(G2)	TGAACACAATCCAGTTGTTATGGTTCACGGTA TTGGAGGGGCATCATTCAATTTTGCGGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCTGTATGCAGTTGATTTTTGGGGCA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCGCGTTTTGTGAAAAAGGTATTAGATGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGGGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA

		AAACGTCGTAACACTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGGGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGAGGCCAAAATACGAATTGA
SEQ ID NO: 50	2C5	TGAACACAATCCAGTTGTTATGGTTTCACGGTA TTGGAGGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCAGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCGCGTTTTTGTGAAAAAGGTATTAGATGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGCGGCGCTAACACGCTTTACTAC ATAAAAAATCTGGATGGCGGTAATAAAATTGA AAACGTCGTCACACTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCCAACCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGAGGCCAAAATACGAATTGA
SEQ ID NO: 51	KV1(2A6)	TGAACACAATCCAGTTGTTATGGTTTCACGGTA TTGGAGGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTCAAGGACA AGACAGGCACAAATTATAACAATGGCCCGGTA TTATCACGATTTTGTGAAAAAGGTATTAGATGA AACCGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGCGGCGCTAACACGCTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGTACTGAT CCCAACCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTTAACGGCGGGGGCCAGAATACGAATTGA
SEQ ID NO: 52	2D13(G2)	TAAACACAATCCAGTTGTTATGGTTTCACGGTA TTGGAGGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACGAGCTGTATGCGGTTGATTTTTGGGACG AGACAGGGACGAATTATAACAATGGCCCGGTA

		TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACCGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACGCTTGGCGGCGCGAACCGTT CGACGACAAGCAAGGCGCTTCCGGGTACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTGAACGGCGGAGGCCAAAAATACGAATTGA
SEQ ID NO: 53	3C8	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCGCG GGACAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAGTTGA AAACGTCGTAACACTTGGCGGCGCGAATCGTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAACGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GACTGAACGGCGGGGGCCAAAAATACAAATTGA
SEQ ID NO: 54	2D5	TGAACACAATCCAGTTGTTATGGTTCACGGTA TCGGAGGGGCATCATTCAATTTTGC GGGAATT AAGAGCTATCTCGTATCTCAGGGCTGGTCACG GGGCAAGCTGTATGCGGTTGATTTTTGGGACA AGACAGGGACGAATTATAACAATGGCCCGGTA TTATCACGATTTGTGCAAAAGGTTTTAGACGA AACGGGTGCGAAAAAAGTGGATATTGTCGCTC ACAGCATGGGTGGCGCGAACACACTTTACTAC ATAAAAAATCTGGACGGCGGAAATAAAATTGA AAACGTCGTAACACTTGGCGGCGCGAACC GTT CGACGACAAGCAAGGCGCTTCCGGGAACAGAT CCAAATCAAAAGATTTTATACACATCCATTTA CAGCAGTGCCGATATGATTGTCATGAATTACT TATCAAAATTAGACGGTGCTAAAAATGTTCAA ATTCATGGCGTTGGGCACATTGGTTTATTGAT GAACAGCCAAGTCAACAGCCTGATTAAAGAAG GGCTGAACGGCGGAGGACAAAAATACAAATTGA

SEQ ID NO: 55	405 (pumilus)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTPYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNAQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 56	406 (subtilis)	MKFVKRRIIALVTILMLSVTSFLFALQPSAKAA EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFWDKTGTNYNNGPVLPFRVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKVA NVVTLGGANRLTTGKALPGTDPNQKILYTSIY SSADMIVINYLSRLDGARNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGGLNTN
SEQ ID NO: 57	402 (megaterium)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA DTIQLLWFTGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGGHNTN
SEQ ID NO: 58	400 (lentus)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGGLNTN
SEQ ID NO: 59	396 (circulans)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGGLNTN
SEQ ID NO: 60	392 (azotoformans)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GELYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSANMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGGLDTN
SEQ ID NO: 61	398 (firmus)	MKFVKRRIIALVTILVLSVTSFLFAMQPSAKAA EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY

		SSADMIVMNYLSKLDGAKNAQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 62	393 (badius)	MKFVKRRIIALVTILVLSVTSLFAMQPSAKAA EHNPPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 63	Dc5h	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFKDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGANRLTTGKALPGTDPNQKILYTSIY SSADMIVMNYLSRLDGARNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGGLNTN
SEQ ID NO: 64	Dc5f	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFXDKTGNNRNNGPRLSRFVKDVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGDKIE NVVTIGGANGLVSSRALPGTDPNQKILYTSVY SSADLIVVNSLSRLIGARNLIHGVGHIGLLT SSQVKGYIKEGLNGGGGLNTN
SEQ ID NO: 65	Dc5c1	MKVIFVKRSLQILVALALVLGSIQFIQPKA KAAEHNPPVVMVHGMGGASYNFASIKRYLVSQG WDQNQLFAIDFIDKTGNNLNNGPRLSRFVKDV LAKTGAKKVDIVAHSMGGANTLYYIKNLDGGD KIENVVTLGGANGLVSLRALPGTDPNQKILYT SVYSSADLIVVNSLSRLIGARNVLIHGVGHIG LLTSSQVKGYVKEGLNGGGQNTN
SEQ ID NO: 66	Dc5a2	MKVIFVKRSLQILVVLALVMGSMAFIQPKEI RAAEHNPPVVMVHGMGGASYNFASIKSYLVSQG WDRNQLFAIDFIDKTGNNRNNGPRLSRFVKDV LAKTGAKKVDIVAHSMGGANTLYYIKNLDGGD KIENVVTLGGANGLVSLRALPGTDPNQKILYT SVYSSADLIVVNSLSRLIGARNVLIHGVGHIG LLASSQVKGYIKEGLNGGGQNTN
SEQ ID NO: 67	Dc512	MKVIFVKRSLQILIALALVIGSMAFIQPKEA KAAEHNPPVVMVHGIGGASYNFFSIKSYLATQG WDRNQLYAIDFIDKTGNNRNNGPRLSRFVKDV LDKTGAKKVDIVAHSMGGANTLYYIKNLDGGD KIENVVTIGGANGLVSSRALPGTDPNQKILYT SVYSSADLIVVNSLSQFNWRKKHPDPGVGHIG LLTSSQVKGYIKEGLNGGGGLNTN
SEQ ID NO: 68	Sga	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFRDKTGNNLNNGPVLSRFVKKVLDE



		TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLVTGKALPGTDPNQKILYTSVY SSADMIVMNYLTKLDGAKNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 69	Sgc	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFWDKTGNNLNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLVTGKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 70	Sgd	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFSDKTGNNLNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLVTGKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 71	Sgf	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFKDKTGNNRNNGPRLSRFVKDVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGDKIE NVVTIGGANGLVSSRALPGTDPNQKILYTSVY SSADLIVVNSLSRLIGARNVQIHGVGHIGLLT SSQVKGYYIKEGLNGGGLNTN
SEQ ID NO: 72	Sgh	MKFVKRRILALVTILMLSVTSLFALQPSAKAA EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFIDKTGNNRNNGPRLSRFVKDVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGDKIE NVVTIGGANGLVSSRALPGTDPNQKILYTSVY SSADLIVVNSLSRLIGARNVQIHGVGHIGLLT SSLVKGYYIKEGLNGGGQNTN
SEQ ID NO: 73	Mt2b1	MKVIFVKRSLQILVALALVIGSMAFIQPKIE KAAEHNPNVVMVHGIGGASYNFASIKSYLVNQ WDRNQLFAIDFIDKTGNNRNNGPRLSRFVKDV LDKTGAKKVDIVAHSMGGANTLYYIKNLDGGD KIENVVTIGGANGLVSLRALPGTDPNQKILYT SVYSSADLIVVNSLSRLTGARNVLIHGVGHIG LLTSSQVKGYYIKEGLNGGGLNTN
SEQ ID NO: 74	H2a	MKFVKRRIIALVTILMLSVTSLFALQPSAKAA EHNPNVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFRDKTGNNRNNGPRLSKFVKDVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGDKIE NVVTIGGANGLVSSRALPGTDPNQKILYTSVY KLSRSHCRQQSLSFNWLQETVQIHGVGHIGLL TSSQVKGYYIKEGLNGGGLNTN

SEQ ID NO: 75	1f15(G2)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGTNRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 76	3C12	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVKDVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 77	3N19(G2)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDRTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY GSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 78	G2.2	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY GSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 79	2C3	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTIGGANLVSSRALPGTDPNQKILYTSVY SSADLIVVNSLSRLIGARNVQIHGVGHIGLLT SSQVKGYIKEGLNGGGHNTN
SEQ ID NO: 80	2F11	EHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSRALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVKGYIKEGLNGGGLNTN
SEQ ID NO: 81	KV11(6C7)	EHNPVVMVHGIGGASFSFAGIKSYLVSQGWSR GKLYPVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 82	KV6(3A1)	EHNPVVMVHGIGGASFSFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM

		NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 83	KV2(2D1)	EHNPPVVMVHGIGGASYSFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 84	N2.5	EHNPPVVMVHGIGGASYSFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHTGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 85	KV5(2H6)	EHNPPVVMVHGIGGASYNFAGIKSYLVSQGWSR GKLYTVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLVTGKALPGTDPNQKILYASVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 86	3E5	EHNPPVVMVHGIGGASFNFAGIRSYLVSQGWSR GKLYAVDFWDRGTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLY SSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 87	G2.1	EHNPPVVMVHGIGGASFNFAGIRSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGTNRLTTSRALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 88	3H24(G2)	EHNPPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKPYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 89	KV10(4G6)	EHNPPVVMVHGIGGASFNFAGIKSYLVSQGWPR DKLYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE SVVTLGGANRLVTGKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 90	KV12(6D4)	EHNPPVVMVHGIGGASFSFAGIRSYLVSQGWPR DKLYAVDFWDKTGTNYNNGPVLRSFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGANRLTTGKALPGTDPNQKILYTSVY

		SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNRLIKEGLNGGGHNTN
SEQ ID NO: 91	N2.2	EHNPVVMVHGIGGASFSFAGIRSYLVSQGWPR DKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAYSMGGANTLYYIKNLDGGNKVE NVVTLGGANRLTTGKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNRLIKEGLNGGGHNTN
SEQ ID NO: 92	N2.3	EHNPVVMVHGIGGASFSFAGIRSYLVSQGWPR DKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVG NVVTLGGANRLTTGKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNRLIKEGLNGGGHNTN
SEQ ID NO: 93	N2.1	EHNPVVMVHGIGGASFSFAGIRSYLVSQGWPR DKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGANRLTTGKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNRLIKEGLNGGGHNTN
SEQ ID NO: 94	KV4(2E12)	EHNPVVMVHGIGGTSFNFAGIKSYLVSQGWSR DKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 95	KV9(4C6)	EHNPVVMVHGIGGASFSFAGIKSYLVSQGWSR DKLYAVDFSCKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 96	7D6	KHNPVVMVHGIGGASYNFAGIKSYLVSQGWSR DKLYAVDFSCKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGLNTN
SEQ ID NO: 97	3F3	EHNPVVMVHGIGGASFNFAGIKSYLESQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKALDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRLTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 98	2D11(G2)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDRGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE

		NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 99	3C23(G2)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDRGTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGHNTN
SEQ ID NO: 100	G2.3	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDRGTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 101	2A3	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFKDKTGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGGLNTN
SEQ ID NO: 102	2F4	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFWDKTGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGDKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSVY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 103	2B9(G2)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFWGKTGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 104	2C5	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 105	KV1(2A6)	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFKDKTGTGTNYNNGPVLSRFVKKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 106	2D13(G2)	KHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DELYAVDFWDETGTGTNYNNGPVLSRFVQKVLDE

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		TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 107	3C8	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR DKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKVE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN
SEQ ID NO: 108	2D5	EHNPVVMVHGIGGASFNFAGIKSYLVSQGWSR GKLYAVDFWDKTGTNYNNGPVLSRFVQKVLDE TGAKKVDIVAHSMGGANTLYYIKNLDGGNKIE NVVTLGGANRSTTSKALPGTDPNQKILYTSIY SSADMIVMNYLSKLDGAKNVQIHGVGHIGLLM NSQVNSLIKEGLNGGGQNTN